Montana Fish, Wildlife & Parks

March 2, 1998

1420 East 6th Ave.
P.O. Box 200701
Helena, MT 59620-0701

Environmental Quality Council
Montana Department of Environmental Quality
Montana Department of Fish, Wildlife and Parks
    Fisheries Division
    Endangered Species Coordinator
    Nongame Coordinator
    Missoula Office
Montana State Library
MT Environmental Information Center
Montana Audubon Council
Bitterroot Conservation District
U.S. Army Corp of Engineers, Helena
U.S. Fish and Wildlife Service, Helena
Montana State Library, Helena
State Historic Preservation Office, Helena
Rex Hendrickson, 1488 Highway 93 North, Victor, MT 59875
Westwater Consultants, Inc.

Ladies and Gentlemen:

Please find enclosed an Environmental Assessment prepared for a Future Fisheries Project tentatively planned to restore stream channel stability and fish habitat in a 1 mile reach of Mill Creek located near the town of Victor.

Please submit any comments that you have by 5 P.M., April 1, 1998 to the Department of Fish, Wildlife and Parks in Helena at the address listed above. If you have any questions, feel free to contact me at (406) 444-2432.

Sincerely,

Mark Lere

Mark Lere, Program Officer
Habitat Protection Bureau
Fisheries Division

Ravalli

ENVIRONMENTAL ASSESSMENT
Fisheries Division
Montana Fish, Wildlife and Parks
Mill Creek Restoration Project

General Purpose: The 1995 Montana Legislature enacted statute 87-1-272 through 273 which directs the Department to administer a Future Fisheries Improvement Program. The program involves physical projects to restore degraded fish habitat in rivers and lakes for the purposes of improving wild fisheries. The legislature established an earmarked funding account to help accomplish this goal. This project is being proposed to restore stream stability and fish habitat on a one mile segment of Mill Creek located near the town of Victor.

I. Location of Project: This project will be conducted on Mill Creek near the town of Victor within Township 7 North, Range 20 West, Section 19 in Ravalli County.

II. Need for the Project: Department Goal A indicates that a Fisheries Division objective is to "protect existing aquatic habitat and improve degraded stream systems for the welfare of healthy fish populations and other wildlife species and for public enjoyment and use." The Future Fisheries Improvement Program is a tool to help achieve that objective.

Mill Creek's significance as a fishery is magnified because it is one of just a few streams that continue to have connectivity to the west side of the Bitterroot River. Due to past land use activities, however, the reach of Mill Creek located within the proposed project area has become unstable. This instability is displayed by excessive stream bank erosion, an aggrading stream bed, rapid lateral migration of the active channel and poor fish habitat. In the recent past, riparian fencing has been constructed to exclude cattle grazing from this reach of stream. Recent floods, however, have damaged some of this fence. This proposed project would restore approximately 1 mile of degraded stream by repairing damages to the riparian fencing, re-establishing a stable channel form and stabilizing eroding banks.

III. Scope of the Project:

The proposal calls for restoring approximately 1 mile of degraded stream. Work would include repairing damages to fencing that acts as a riparian exclosure; re-shaping the stream channel to reduce width to depth ratios, create appropriate meander patterns and improve sediment transport capabilities; stabilizing eroding banks using whole tree root wads, footer and cover logs and sod and shrub transplants; and controlling channel grade using log vanes or rock and log "V" structures. These activities would enhance the overall health of the stream by reducing sediment input into downstream waters, improving sediment transport capabilities, creating pool habitat for trout holding areas, and cleansing spawning gravels. This project is expected to cost $90,500.00. Of this total, the Future Fisheries Improvement Program would be contributing up to $30,000.00.

IV. Environmental Impact Checklist:

Please see attached checklist.

V. Explanation of Impacts to the Physical Environment

1. Terrestrial and aquatic life and habitats.

Protecting the riparian zone from livestock grazing and stabilizing the existing channel is expected to create a more diverse and healthy habitat for aquatic life. Expected improvements in the aquatic habitat should enhance resident trout populations in the stream as well as increase the recruitment of trout to the Bitterroot River. Habitat for riparian dependent wildlife would also be improved through the restoration of the riparian vegetative community.

2. Water quantity, quality and distribution.

Short term increases in turbidity will occur during project construction. To minimize turbidity, construction will occur during a low flow period and operation of equipment in the stream channel will be minimized to the extent practicable. A permit for a short term exemption from turbidity will be obtained from the Water Quality Bureau and a 310 permit will be obtained from the local Conservation District. In the long term, protecting the riparian zone from livestock grazing and stabilizing the existing channel would reduce the sediment contribution to downstream areas, thereby improving the overall quality of downstream waters.

3. Geology and soil quality, stability and moisture.

No effects on geology and soils are expected above the high water mark. Below the high water mark, the project is expected to create a more stable stream channel. Sediment removed from the channel would be placed on newly created point bars and re-vegetated.

4. Vegetation cover, quantity and quality.

Riparian vegetation and cover would be improved by protecting the riparian zone from cattle grazing, creating a more stable stream channel and trans-planting sod and shrubs along the stream corridor.

5. Aesthetics.

Aesthetics would be enhanced by restoring a degraded reach of stream to a more healthy and natural stream environment. A one mile reach would be restored to a Rosgen type C-4 channel, erodible banks would be stabilized and the riparian vegetative community would be enhanced through trans-plants of sod and shrubs. Additionally, the riparian zone would be protected from livestock grazing by fencing.

9. Historic and archaeological sites

The proposed project will likely require an individual Army Corp of Engineers (COE) 404 permit. Therefore, the State Historic Preservation Office has been contacted to determine the need for compliance with the federal historic preservation regulations. The project will not begin until a cultural clearance is granted.

VI. Explanation of Impacts on the Human Environment.

7. Access to & quality of recreational activities.

It is anticipated that restoration of this one mile reach of Mill Creek would improve overall aquatic habitat and, as a result, would enhance trout populations residing in the stream and would improve recruitment of trout to the Bitterroot River. As a result, the recreational fishery in both the stream and the river would be expected to be improved.

VII. Discussion and Evaluation of Reasonable Alternatives.

1. No Action Alternative

If no action is taken, a 1 mile reach of Mill Creek will remain degraded, fish populations will remain low and recruitment to the Bitterroot River will remain marginal. In addition, habitat for riparian dependent wildlife will remain in a degraded condition. Recreational opportunities associated with fish and wildlife resources will remain reduced and aesthetics will continue to be impaired.

2. The Proposed Alternative

The proposed alternative is designed to protect the riparian zone from livestock grazing, re-construct the stream channel to appropriate hydrologic dimensions and stabilize erodible banks using natural material revetment and riparian plantings. These activities would restore the riparian vegetative community and create more diverse habitat for aquatic life and riparian dependent wildlife. This alternative would improve fish and wildlife habitat, aesthetics and water quality within the project area and would be expected to increase trout populations in both the stream and the Bitterroot River.

VIII. Environmental Assessment Conclusion Section

1. Is an EIS required? No.

We conclude from this review that the proposed activities will have a positive impact on the physical and human environment.

2. Level of public involvement.

The proposed project was reviewed and supported by the public review panel of the Future Fisheries Improvement program. The proposed project also will be

reviewed by the Fish, Wildlife and Parks Commission and will be contingent upon their approval. The Environmental Assessment (EA) is being distributed to all individuals and groups listed on the cover letter. The EA will be published on the Montana Electronic Bulletin Board.

3. Duration of comment period?

Public comment will be accepted through 5 P.M. on April 1, 1998.

4. Person responsible for preparing the EA.

Mark Lere, Program Officer
Habitat Protection Bureau
Fisheries Division
Montana Department of Fish, Wildlife and Parks
1420 East 6th Avenue
Helena, MT 59620

Telephone: (406) 444-2432

MONTANA DEPARTMENT OF FISH, WILDLIFE AND PARKS
1420 E 6th Ave, PO BOX 200701, Helena, MT 59620-0701
(406) 444-2535

ENVIRONMENTAL ASSESSMENT

Project Title Mill Creek Restoration Project

Division/Bureau Fisheries Division -Future Fisheries Improvement

Description of Project The project is being proposed to restore stream stability and fish habitat on a 1 mile reach of Mill Creek located near the town of Victor.

POTENTIAL IMPACT ON PHYSICAL ENVIRONMENT

	MAJOR	MODERATE	MINOR	NONE	UNKNOWN	COMMENTS ON ATTACHED PAGES
1. Terrestrial & aquatic life and habitats		X				X
2. Water quality, quantity & distribution			X			X
3. Geology & soil quality, stability & moisture			X			X
4. Vegetation cover, quantity & quality			X			X
5. Aesthetics			X			X
6. Air quality				X		
7. Unique, endangered, fragile, or limited environmental resources				X		
8. Demands on environmental resources of land, water, air & energy				X		
9. Historical & archaeological sites				X		X

POTENTIAL IMPACTS ON THE HUMAN ENVIRONMENT

	MAJOR	MODERATE	MINOR	NONE	UNKNOWN	COMMENTS ON ATTACHED PAGES
1. Social structures & mores				X		
2. Cultural uniqueness & diversity				X		
3. Local & state tax base & tax revenue				X		
4. Agricultural or industrial production				X		
5. Human health				X		
6. Quantity & distribution of community & personal income				X		
7. Access to & quality of recreational and wilderness activities			X			X
8. Quantity & distribution of employment				X		
9. Distribution & density of population & housing				X		
10. Demands for government services				X		
11. Industrial & commercial activity				X		
12. Demands for energy				X		
13. Locally adopted environmental plans & goals				X		
14. Transportation networks & traffic flows				X		

Other groups or agencies contacted or which may have overlapping

jurisdiction Bitterroot Conservation District, NRCS, Army Corp of Engineers

Individuals or groups contributing to this EA Westwater Consulting, Inc.

Recommendation concerning preparation of EIS No EIS required.

EA prepared by : Mark Lere

Date: March 2, 1998